

Claim 2 has been amended to more particularly point out and clearly define what Applicants consider to be their invention. Claim 2 has been amended to delete the term "or the like" which appeared at the end of the claim. To improve the syntax of the claim, the term "or" was entered after the motor in line 3. Applicants respectfully submit that no new matter has been entered by way of amendment to the claims. Applicants submit that the amendment to Claim 2 was not entered to overcome any prior art reference of which Applicants are aware nor for any reason other than to conform the claim to United States Patent Practice.

Before discussing the rejections over the prior art, Applicants deem it prudent to set forth what they consider to be their invention. Applicants invention is a flow and temperature control valve in which the flow and temperature are controlled by relative rotation between two disks having through apertures. The flow through the aperture or apertures in the second disk may be varied by controlling the alignment between the through apertures in the first and second disks. There are additional claims directed to the construction of the various disks, the gaskets required and arrangements in which two valve systems are controlled to provide control of two different fluids. Applicants respectfully submit that the control and mixing valve of the present invention is neither taught nor suggested by the prior art references cited by the Examiner.

Claims 1-8, 10-28, 33 and 34 stand rejected under 35 U.S.C. §103(a) as unpatentable over Saether (U.S. Patent No. 4,611,757) in view of Knebel (U.S. Patent No. 4,700,885). Applicants respectfully submit that Saether and Knebel whether considered alone or in combination neither teach nor suggest the present invention.

Saether discloses a flow and temperature control valve wherein the temperature is controlled by alignment of through apertures in a disk with an indentation in a second disk and the mixed flow passes through the first disk to the area of use. When the volume of flow is to be increased or decreased, the second disk having the indentation is moved linearly along the first disk having the through apertures. Applicants respectfully submit that Saether discloses a substantially different method of controlling the flow and temperature of the liquid streams controlled by the valve. Applicants respectfully submit that Saether requires both a

rotatable alignment of the two disks along with linear movement of the second disk relative to the first disk. And in addition, Saether does not provide a second disk with a through aperture. Applicants respectfully submit that Saether neither teaches nor suggest the present invention.

The deficiencies in Saether are not cured by combination with Knebel. Knebel discloses a valve in which two rotating disk having through apertures are used to stop or permit the flow of two liquids through the valve. There is neither teaching nor suggestion to rotate the two disks to control the flow of the two different streams into the mixing zone of the valve device other than in an on/off manner. To provide temperature control, Saether provides a thermostatic type device which operates to move a third disk rectilinearly to control the temperature of the mixed fluid. The rectilinear adjustment of the third disk is set forth at column 3, lines 9-11. The use of the rotation of the second disk relative to the first disk only to open and close the valve is set forth at column 3, lines 30-35. Applicants respectfully submit that Knebel discloses a device similar to Saether in that the valve requires both rotary motion and rectilinear motion to control the temperature of the fluid. The rotation of the two valve disks having through apertures are provided merely to open or close the valve for fluid flow and do not provide any control of the liquid flow or temperature. The liquid flow control is provided by the thermostat and the rectilinear motion provided to the third disk.

Applicants respectfully submit that there would be no incentive to provide the through apertures in the on/off control disks of Knebel to the flow control required in the Saether valve device. Applicants submit that Saether and Knebel both require the rectilinear motion to provide control for flow and temperature. Since the valve of the present invention does not require rectilinear movement of a disk, Applicants respectfully submit that the combination of Saether with Knebel would neither teach nor suggest the present invention.

In addition, there is neither teaching nor suggestion in Saether and Knebel, whether considered alone or in combination of the sealing region of Claim 3; the friction reducing region of Claim 4; arranged around the periphery of the first disk member Claim 5; or extending radially Claim 6, or a sector shaped aperture Claims 7, 8, 11; a first disk having a removed interior region Claim 12; having two valve units

and at least one electric motor Claim 15; operation of two or more manifold outlets Claims 24 and 28; a diversion Claim 27.

In view of the amendments entered in the specification, drawings and claims and the above discussion, Applicants respectfully submit that the application is in condition for allowance and favorable consideration is requested.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Daniel S. Ortiz". The signature is fluid and cursive, with the first name "Daniel" being the most prominent part.

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